Letter to the Editor

Missing cervical cancer patients in India: Time to rejuvenate follow up strategy through mhealth

Dear Sir,

Intent of the letter

Cervical cancer is the one of the most common cancer in women worldwide and a major health menace among women in low and middle income countries like India. In an elaborate study conducted in India it was found that mounting number of cervical cancer patients are missing after their first hospital visit due to inappropriate screening and follow up strategy [1]. The patients who have undergone Pap test were advised to return back to the collection centre on day seventh to collect the reports from cytopathology centre. But this second visit acts as rate limiting step leading to a high loss to follow up as several women never reported back to collect their reports due to resistive affordability and logistic barrier. Since many of them among these missing patients are also diagnosed as preneoplastic lesions such losses met with heavy price turning to even frank carcinoma cervix in near future. This is not only thwarting patients for treatment but even worsening the cervical cancer status in India. This has had press hard to find an effective overhauling solution to this failing strategy.

Global perspective of mhealth

In the backdrop of this grave situation mhealth or mobile health seems to be an effective remedial mechanism. The unprecedented spread of mobile technologies as well as advancements in their innovative applications to address health priorities has evolved into a new field of eHealth, known as mHealth. The field’s potential had been recognised by the United Nations (UN) and World Health Organization (WHO). The Global Observatory for eHealth (GoE) defined mHealth or mobile health as medical and public health practice supported by mobile devices, such as mobile phones, patient monitoring devices, personal digital assistants (PDAs), and other wireless devices. According to the International Telecommunication Union there are now close to 5 billion mobile phone subscriptions in the world. The penetration of mobile phone networks in many low and middle income countries surpasses other infrastructure such as paved roads and electricity and dwarfs fixed Internet deployment [2]. With increased accessibility comes the possibility of greater personalisation and citizen-focused public health and medical care. It is thus utmost essential to reap the multiplier effect of mhealth in tandem with various government programmes such as Digital India to effectively mobilise telecommunication resources in healthcare services.

Proposal for resolving loss to follow up

There are number of factors influencing the cervical cancer screening in India such as multiple visits to screening facility which increases loss to follow up. It can be owed due to financial losses of the screened women and her attendants where income source is majorly rested upon their daily wages [1,3]. Therefore it is proposed that during their Pap smear test all women and their relatives contact mobile number should be taken to create Health directory. After cytopathology report creation, it will be send to concerned mobile number via SMS with attached Pap report copy and the physician’s advice about normality or abnormality in the local language and guidance for further line of action. If their report is abnormal they will be specifically rang with advice and guided to follow visit to the concerned treatment facility. If they fail to follow advice then nearest responsible health professional can be asked to seek these women in regular terms for specialise treatment. Proposed theory can be exemplified further through the contact tracing system followed in diagnosing and following sexually transmitted infection in India. This will lead into translating current doctor centric health care approach into patient centric approach along with use of ICT. Furthermore these women can be followed in future on regular occasions for materialising targeted healthcare. Usually large number of women has negative Pap test with no abnormality detected (NAD), thus this approach will decrease even the unnecessary visit to the health facility reducing both the burden on health care facility and the unnecessary financial losses of the patients undergoing screening. Furthermore it will be amazing to investigate further the role of ASHA (Accredited Social Health Activist, a recruited cadre of zealous female health worker more than 8 lakhs in number) participating in its realisation [4].

Global success stories of mhealth

Few examples for utilisation of mhealth are, the Ministry of Bangladesh in 2007, started a project to increase awareness of its health campaigns by broadcasting SMS to all mobile numbers in the country to mobilise citizens for raising awareness such as National Immunisation, National Breastfeeding Week, and National Safe Motherhood Day. Similarly Mobile communications between doctors in Ghana improved medical practice, Cam e-WARN; monitoring disease outbreaks in Cambodia via SMS, Be Healthy, Be Mobile initiative of ITU and WHO’s mhealth for Tobacco control remained success stories [2].

Thus mobile technology infrastructure has enormous potential for community mobilisation in developing countries such as India in disseminating government health programmes and news, improving timely access to emergency and general health services, geriatric care, adapting social-health linkages, reducing drug shortages at health clinics, enhancing clinical diagnosis and treatment adherence. Remedy as described for the missing patients in
cervical cancer screening is one of the optimistic example. This can supplement and even replace the overburdened brick and mortar healthcare system in providing unprecedented healthcare diffusion deep in society, realising universal concept of ‘Affordable Health for All’.

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**References**


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